

IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): An apparatus for establishing and outputting a succession of ~~information items~~ music titles in which an artistic or rational link is reflected in said succession of ~~information items~~, said apparatus, comprising:

first input means for receiving a sequence of information comprising an audio data stream of information items music titles in which an initial artistic or rational link is considered to exist between at least some pairs of adjacent items;

segmentation means for recovering information items from said stream of information items in response to extracting segmentation data indicating end limits of said information items; music titles from a website associated to a source of said audio data stream, for receiving said segmentation data through second input means separate from the audio data stream, and for recovering music titles from said audio data stream in response to said segmentation data; and

means for storing said recovered information items; music titles.

means for indexing said recovered information items with distance information indicative of relative separation between information items in the information stream; and

means for analyzing said distance information to select an information item to be entered into said succession to be established on the basis of an earlier information item in said succession and a separation between said earlier item and the selected item of information.

Claim 2 (Currently Amended): The apparatus according to claim 1, wherein ~~the received sequence of information is in a data stream form~~, said segmentation means being responsive to time information in said segmentation data indicating times of occurrence of

said end limits of said ~~information items~~ music titles for cutting up said audio data stream automatically ~~dividing the stream in order~~ to extract said segments therefrom.

Claims 3-6 (Canceled).

Claim 7 (Currently Amended): The apparatus according to claim [[1]] 6, wherein said input means ~~is adapted to receive~~ includes means for receiving said audio data from a radio station and sending a sequence of music titles in accordance with a music program.

Claims 8-9 (Canceled).

Claim 10 (Previously Presented): The apparatus according to claim 1, further comprising:

identification means connectable to a source of identification data identifying information items in said sequence of information, said identification means extracting at least some of said identification data to form an identifier, and

combining means for combining with a given segment an identifier corresponding thereto,

said storage means further being arranged to store said identifier corresponding to said segment.

Claim 11 (Previously Presented): The apparatus according to claim 10, wherein said identifier includes data indicative of an attribute under which respective groups of said segments can be generically identified and classified.

Claim 12 (Previously Presented): The apparatus according to claim 11, wherein said attribute corresponds to at least one type of music under which a music title can be classified.

Claim 13 (Previously Presented): The apparatus according to claim 12, wherein said identifier includes artist data indicative of an artist associated with the corresponding music title, and said apparatus further comprises deriving means for deriving at least one said type of music based on said artist data.

Claim 14 (Previously Presented): The apparatus according to claim 1, further comprising similarity analyzing means for automatically analyzing similarity relations between stored segments in terms of their closeness in said sequence of stored segments.

Claim 15 (Previously Presented): The apparatus according to claim 1, wherein said producing means produces said similarity relations by producing, for each segment corresponding to an information item considered in a given stored sequence, a similarity relation representation expressing a distance between that information item and other stored information items.

Claim 16 (Previously Presented): The apparatus according to claim 15, wherein said similarity relation representation contains, for each said other information item, a closeness value determined between pairs formed by said information item considered and said other information item.

Claim 17 (Previously Presented): The apparatus according to claim 16, wherein said producing means is arranged to calculate said closeness value for said information item

considered by attributing a first closeness value each time said other information item appears just before or just after in said sequence,

said first closeness value being cumulated over said sequence to yield a cumulated value indicating a closeness of said pairs of information items.

Claim 18 (Previously Presented): The apparatus according to claim 17, wherein said producing means is further arranged to attribute a second closeness value, smaller than said first closeness value, each time said other information item is separated from said information considered by  $m$  separating information items, where  $m$  is an upper bounded number,

said first and second closeness values being cumulated over said sequence to yield a cumulated value indicating the closeness of said pairs of information items.

Claim 19 (Previously Presented): The apparatus according to claim 18, wherein said number  $m$  of separating information items is equal to one.

Claim 20 (Previously Presented): The apparatus according to claim 1, wherein said apparatus further comprises a music program generating means for building a sequence of information items from said stored segments.

Claim 21 (Previously Presented): The apparatus according to claim 20, wherein said program generating means is capable of building said sequence of information items in response to user preferences expressed through user inputs.

Claim 22 (Previously Presented): The apparatus according to claim 20, wherein said program generating means is capable of building said sequence of information items in

response to similarity relations between stored segments in terms of their closeness values in said sequence of stored segments, in which information items are concatenated by taking their closeness values into account.

Claim 23 (Previously Presented): The apparatus according to claim 21, wherein said program generating means is responsive to a user input expressing a like or dislike, associated to at least some information items in said succession of information items, to create a sequence of information items in which said disliked information items are removed and liked information items are emphasized.

Claim 24 (Previously Presented): The apparatus according to claims 22, wherein said program generating means is further responsive to said similarity relations to create a sequence of information items in which information items close to disliked information items are de emphasized and/or in which information items close to liked information items are emphasized.

Claim 25 (Previously Presented): The apparatus according to claim 20, wherein said program generating means is responsive to a selected attribute of said information items said selected attribute being entered through a corresponding user input, to create a sequence of information items containing at least a preponderance of information items falling under said selected attribute.

Claim 26 (Previously Presented): The apparatus according to claim 25, wherein said program generating means is arranged to create a sequence of information items by taking into account said selected attributes associated to said information items, and

wherein said program generating means is further responsive to a discovery parameter entered through a user input, said discovery parameter indicating a degree of closeness of said sequence to said selected attribute.

Claim 27 (Canceled).

Claim 28 (Previously Presented): The apparatus according to claim 26, wherein said program generating means is further responsive to said similarity relations between the stored segments in terms of their closeness in said sequence of stored segments, such that said information items do not fall under said selected attribute and are entered in said created sequence when said information items have a predetermined degree of closeness, as determined by said similarity relations, with an adjacent information item of said sequence.

Claim 29 (Previously Presented): The apparatus according to claim 20, wherein said program generating means comprises means for labeling and storing said created sequences as objects which can be selectively exported outside said apparatus.

Claim 30 (Previously Presented): The apparatus according to claim 29, further comprising importing means for importing said created sequences.

Claim 31 (Previously Presented): The apparatus according to claim 29, wherein said apparatus is connected to a playback means for receiving said segments of a selected created sequence.

Claim 32 (Previously Presented): The apparatus according to claim 1, wherein said apparatus produces at least one preference, said preference being a user preference comprised of the succession of information items produced by taking into account feedback from said user, or a generic preference comprised of a sequence.

Claim 33 (Currently Amended): A method for establishing and outputting a succession of ~~information items~~ music titles in which an artistic or rational link is reflected in said succession of ~~information items~~, said method comprising the steps of:

~~receiving a sequence of information comprising~~ receiving from a website associated to a source of said ~~information items~~ music titles in which an initial artistic or rational link is considered to exist between at least some pairs of adjacent items;

~~recovering information items~~ receiving from a website associated to a source of said ~~audio data stream of information items in response to,~~ segmentation data separate from the ~~audio data stream, said~~ segmentation data indicating end limits of said ~~information items~~ music titles;

~~storing said recovered information items;~~

~~indexing said recovered information items with distance information indicative of relative separation between information items in the information stream; and~~

~~analyzing said distance information to select an information item to be entered into said succession to be established on the basis of an earlier information item in said succession and a separation between said earlier item and the selected item of information.~~

recovering said music titles from said audio data stream in response to said segmentation data; and

storing said recovered music titles.

Claim 34 (Previously Presented): The method according to claim 33, wherein the received sequence of information is in a data stream form, said segmentation being performed in response to time information in said segmentation data indicating times of occurrence of said end limits of said information items for automatically dividing the stream in order to extract said segments.

Claims 35-37 (Canceled).

Claim 38 (Currently Amended): The method according to claim ~~[[37]]~~ 33, wherein said audio data is received from a radio station sending a sequence of music titles in accordance with a music program.

Claim 39 (Previously Presented): The method according to claim 33, further comprising the steps of:

identifying from a source of identification data, information items in said sequence of information, said identifying step extracting at least some of said identification data to form an identifier, and

combining with a given segment an identifier corresponding thereto,  
said identifier being stored in accordance with said segment.

Claim 40 (Previously Presented): The method according to claim 39, wherein said identifier includes data indicative of an attribute under which respective groups of said segments can be generically identified and classified.



Claim 41 (Previously Presented): The method according to claim 40, wherein said attribute corresponds to at least one type of music under which a music title can be classified.

Claim 42 (Previously Presented): The method according to claim 41, wherein said identifier includes artist data indicative of an artist associated with the corresponding music title, and said method further comprises a deriving step for deriving at least one said type of music based on said artist data.

Claim 43 (Previously Presented): The method according to claim 33, further comprising the step of automatically analyzing similarity relations between stored segments in terms of their closeness in said sequence of stored segments.

Claim 44 (Previously Presented): The method according to claim 33, wherein said producing step produces said similarity relations by producing, for each segment corresponding to an information item considered in a given stored sequence, a similarity relation representation expressing a distance between that information item and other stored information items.

Claim 45 (Previously Presented): The method according to claim 44, wherein said similarity relation representation contains, for each said other information item, a closeness value determined between pairs formed by said information item considered and said other information item.

Claim 46 (Previously Presented): The method according to claim 44, wherein said producing step involves calculating said closeness value for said information item considered

by attributing a first closeness value each time said other information item appears just before or just after in said sequence,

said first closeness value being cumulated over said sequence to yield a cumulated value indicating a closeness of said pairs of information items.

Claim 47 (Previously Presented): The method according to claim 46, wherein said producing step is further carried out to attribute a second closeness value, smaller than said first closeness value, each time said other information item is separated from said information considered by m separating information items, where m is an upper bounded number,

said first and second closeness values being cumulated over said sequence to yield a cumulated value indicating the closeness of said pairs of information items.

Claim 48 (Previously Presented): The method according to claim 33, further comprising the step of generating a music program by building a sequence of information items from said stored segments.

Claim 49 (Previously Presented): The method according to claim 48, wherein said program generating step involves building said sequence of information items in response to user preferences expressed through user inputs.

Claim 50 (Previously Presented): The method according to claim 48, wherein said program generating step involves building said sequence of information items in response to said similarity relations between stored segments in terms of their closeness values in said sequence of stored segments, in which information items are concatenated by taking their closeness values into account.

Claim 51 (Previously Presented): The method according to claim 49, wherein said program generating step is carried out by taking into account a user input expressing a like or dislike, associated to at least some information items in said succession of information items, to create a sequence of information items in which said disliked information items are removed and liked information items are emphasized.

Claim 52 (Previously Presented): The method according to claim 50, wherein said program generating step is further carried out by taking into account said similarity relations to create a sequence of information items in which information items close to disliked information items are de-emphasized and/or in which information items close to liked information items are emphasized.

Claim 53 (Previously Presented): The method according to claim 49, wherein said program generating step is carried out by taking into account a selected attribute of said information items, said selected attribute being entered through a corresponding user input, to create a sequence of information items containing at least a preponderance of information items falling under said selected attribute.

Claim 54 (Previously Presented): The method according to claim 53, wherein said program generating step is carried out by creating a sequence of information items and taking into account said selected attributes associated to said information items, and wherein said program generating step is further carried out by taking into account a discovery parameter entered through a user input, said discovery parameter indicating a degree of closeness of said sequence to said selected attribute.

Claim 55 (Previously Presented): The method according to claim 54, wherein said program generating step is further carried out by taking into account said similarity relations between the stored segments in terms of their closeness in said sequence of stored segments, such that said information items do not fall under said selected attribute and are entered in said created sequence when said information items have a predetermined degree of closeness, as determined by said similarity relations, with an adjacent information item of said sequence.

Claim 56 (Previously Presented): The method according to claim 49, wherein said program generating step involves labeling and storing said created sequences as objects which can be selectively exported.

Claim 57 (Previously Presented): The method according to claim 56, further comprising the step of importing said created sequences.

Claims 58-60 (Canceled).